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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/759,424

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Chikuni Kawakami

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BIRCH STEWART KOLASCH & BIRCH
PO BOX 747
FALLS CHURCH, VA 22040-0747

EXAMINER

WANG, KENT F

ART UNIT

PAPER NUMBER

2622

NOTIFICATION DATE

DELIVERY MODE

11/05/2008

ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

mailroom@bskb.com

Office Action Summary	Application No. 10/759,424	Applicant(s) KAWAKAMI, CHIKUNI	
	Examiner KENT WANG	Art Unit 2622	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 17 September 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-10 is/are pending in the application.
- 4a) Of the above claim(s) 3 and 4 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-2, 5-10 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Response to Amendment

1. The amendments, filed on 09/17/2008, have been entered and made of record. Claims 1-10 are pending. Claims 3 and 4 have been withdrawn.

Response to Arguments

2. Applicant's arguments with respect to claims 1-2 and 5-10 have been fully considered but are moot in view of the new ground(s) of rejection.

Claim Rejections - 35 USC § 102

3. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
4. Claims 1-2 are rejected under 35 U.S.C. § 102(b) as being anticipated by Sakurada, US 2002/0037167.

Regarding claim 1, Sakurada discloses a digital camera (camera A100, Fig 10) having an electronic flash device using a light-emitting diode as a flash light source (flash light-emitting device 111, Fig 10), comprising:

- a non-volatile memory (an EEPROM 224 incorporated in the media pack C100, Fig 10) which stores correction information (color correction data) for correcting white balance of an image obtained by flash shooting using the electronic flash device (111 a flash light-emitting device, corresponding to the "flash light-emitting device A103") ([0043], [0067], [0072]), the non-volatile memory (224) storing the correction

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- information set based on a detection result of a color temperature of light actually emitted from the electronic flash device (the color correction using the lookup table may be performed by the CPU based on color correction data stored in the EEPROM 224 within the media pack), wherein the correction information (color correction data) is for the light only of said light-emitting diode (at a step S20 of Fig 17, linear matrix conversion of print colors is performed by using the coefficient data of the color correction matrix stored in the memory of the media pack. Characteristics of changes in respective ink colors dependent on elapsed time after refilling or producing of the inks are measured in advance, and linear matrix coefficients for correcting the change characteristics are stored in the memory within the media pack in the form of a lookup table) ([0067]-[0072] and [0108]); and
- a white balance correcting device (120 is a first CPU controlling the camera section for performing the white balance process A100, Fig 10) which corrects white balance of the image obtained by flash shooting (at the step S44, an exposure operation is carried out by controlling an aperture and a shutter, whereby the CCD 101 is exposed to a predetermined amount of light, then, the program proceeds to a step S45, wherein image processing operations, such as white-balance calibration, gamma correction, color correction and compression, are performed, and at a step S46, the image is stored in the CF card 105, Fig 19) using the electronic flash device (111) based on the correction information stored in the non-volatile memory (if the presence of the media pack is detected, the program proceeds to a step S2, wherein various data stored in the memory, EEPROM M224, within the media pack are read. Then, the

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program proceeds to a step S3, wherein it is determined whether or not the reading of the data was successfully performed) ([0098]).

Regarding claim 2, Sakurada discloses digital camera (camera A100, Fig 10) having an electronic flash device (flash light-emitting device 111, Fig 10) using a light-emitting diode as a flash light source (flash light-emitting device 111 to emit the flashing light), comprising:

- a non-volatile memory (an EEPROM 224 incorporated in the media pack C100, Fig 10) which stores correction information (color correction data) for correcting white balance of an image obtained by flash shooting (flash light-emitting device 111), wherein the correction information is for the light only of said light-emitting diode (the color correction using the lookup table may be performed by the CPU based on color correction data stored in the EEPROM 224 within the media pack) ([0072]),
- a white balance correcting device (first CPU 120 controlling the camera section for performing the white balance process, Fig 10) which corrects white balance of the image obtained by flash shooting (flash light-emitting device 111) based on the correction information stored in the non-volatile memory (when the presence of the media pack is detected, the program proceeds to a step S2, wherein various data stored in the EEPROM M224 within the media pack are read, and then, the program proceeds to a step S3, wherein it is determined whether or not the reading of the data was successfully performed) ([0098]),
- a modification information storage device (a second memory for use in image processing 202, Fig 10) which stores modification information for correcting the correction information stored in the non-volatile memory (224), the modification

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- information storage device (202) storing the modification information required to make the correction information stored in the non-volatile memory (224) coincident with correction information set based on a detection result of a color temperature of light actually emitted from the electronic flash device (the color correction using the lookup table (LUT) may be performed by the CPU based on color correction data stored in the EEPROM 224 within the media pack ([0069]-[0072]),
- a modifying device (first CPU 120 controlling the camera section for performing the gamma correction, Fig 10) which modifies the correction information based on the modification information (at the step S45, the program performs image processing operations, such as white-balance calibration, gamma correction, color correction and compression) stored in the modification information storage device (202) ([0118]); and
 - the white balance correcting device (a first CPU 120, Fig 10) corrects the white balance of the image obtained by flash shooting (flash light-emitting device 111) based on the correction information modified by the modifying device (120) (at the step S45, the program performs image processing operations, such as white-balance calibration, gamma correction, color correction and compression) ([0118]).

Claim Rejections - 35 USC § 103

5. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

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6. Claims 5-8 are rejected under 35 U.S.C. § 102(b) as being unpatentable over Sakurada, US 2002/0037167 in view of Kawakami, US 7,106,378.

Regarding claim 5, the limitations of claim 1 are taught above, Sakurada does not disclose an input device for inputting the white balance correction information. However, Kawakami discloses an input device (a camera control part 140, Fig 13) for inputting the white balance correction information (the CPU 138 controls the white balance adjusting circuit according to inputs from a camera control part 140), wherein the memory (the CPU 138, Fig 13) stores the white balance correction information inputted through the input device (140) (11:15-60).

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to include the input device as taught by Kawakami into Sakurada's camera, so that so that the control of the automatic focusing, automatic exposure and automatic white balance can be easily performed (11:52-59, Kawakami).

Regarding claim 6, the limitations of claim 2 are taught above, Sakurada does not disclose an input device (a camera control part 140, Fig 13) for inputting the modification information. However, Kawakami discloses an input device (a camera control part 140, Fig 13) for inputting the modification information (the white balance adjusting circuit 130 outputs the R', G' and B' signals to the gamma correcting circuit 132), wherein the modification information storage device (a memory 136, Fig 13) stores the modification information inputted through the input device (140) (11:15-60).

Regarding claim 7, the limitations of claim 1 are taught above, Sakurada does not disclose the correction information is set based on a characteristic of the LED. However,

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Kawakami discloses the correction information is set based on a characteristic of the LED (as the white balance adjusting circuit 130 outputs the R', G' and B' signals to the gamma correcting circuit 132, the electronic camera emits the light with the color temperature that is the same as the color temperature of the subject light source, and the white balance is corrected according to the color temperature of the subject light source) (4:12-18 and 11:15-31).

Regarding claim 8, this claim recites same limitations as claim 7. Thus it is analyzed and rejected as previously discussed with respect to claim 7 above.

7. Claims 9 and 10 are rejected under 35 U.S.C. § 103(a) as being unpatentable over Sakurada in view of Kawakami, and further in view of Yamamoto (US 6,041,192).

Regarding claim 9, the limitations of claims 1 and 7 are taught above, Sakurada and Kawakami do not disclose the characteristic of the LED is stored in the non-volatile memory as the characteristic of the LED changes with time. However, Yamamoto discloses the characteristic of the LED is stored in the non-volatile memory as the characteristic of the LED changes with time (the amount of light emitted by the LED 42b of the main light source 42 is adjusted based on the information codes 30Q which is corresponding to information such as a photographed date and time, a color temperature information, and so on) (6:31-46 and 12:18-25).

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to include the flash device as taught by Yamamoto into Sakurada and

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Kawakami's camera, so that the white balance adjustment can be easily performed (12:18-25, Yamamoto).

Regarding claim 10, this claim recites same limitations as claim 9. Thus it is analyzed and rejected as previously discussed with respect to claim 9 above.

Conclusion

8. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure: Nakayama (US 6,963,362), Kitajima (US 5,808,681), Kawakami (US 2002/0025157), Oya et al. (US 2003/0052985), Hamamura et al. (US 2003/0133021), Haavisto (US 2001/0007470), and Nagai et al. (US 2003/00161198).

Inquiries

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kent Wang whose telephone number is 571-270-1703. The examiner can normally be reached on 8:00 A.M. - 5:30 PM (every other Friday off).
10. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ngoc Yen Vu can be reached on 571-272-7320. The fax phone number for the organization where this application or proceeding is assigned is 571-270-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information

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about the PAIR system, see <http://portal.uspto.gov/external/portal/pair>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/KW/

24 October 2008

*/Ngoc-Yen T. VU/
Supervisory Patent Examiner, Art Unit 2622*